AIRS Processing at the GES DISC

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- AIRS Evolution at the GES DISC
- AIRS Near-Real-Time Processing at GES DISC

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AIRS Evolution at the GES DISC: What

- What is AIRS Evolution?
  - Update of processing hardware
    - switching from SGI to linux
  - Replacement of ECS tape archives
    - moving to on-line RAID storage
  - Replacement of ECS software
    - moving to S4P-based system

AIRS Evolution at the GES DISC: Why

- Why?
  - Hardware maintenance costs
    - Processing, archive silos, archive front-ends
  - Wanted more architectural agility in order to be more responsive
  - Nearing end-of-life for ECS, both software and hardware

AIRS Evolution at the GES DISC: When

- When?
  - Already migrating L0 and ancillary data
  - Switch to Evolution system production and data access with AIRS v5
  - ECS retirement in Dec 2007

What does it mean?

- Faster reprocessing
  - Target is 10X reprocessing rate
- Easier, faster access to data
  - Direct ftp access similar to datapool
- Additional services
  - GIOVANNI, Mirador
- Data access instead of data ordering
- On-demand subsetting replaced with “on-the-fly” subsetting

AIRS Near-Real-Time Processing at GES DISC

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AIRS Near-Real-Time Processing at GES DISC

- ftp://g0dps01u.ecs.nasa.gov/services/nrt/DATA
- New capability for Goddard DISC
  - Receive rate-buffered data (RBD) from EDOS
  - Turn RBD data into "regular" AIRS-size L0 granules
  - Process to higher level using AIRS software
  - Software from a variety of sources: NOAA, UW, AIRS, GES DISC
- Conceptually an easy task, not so in practice

AIRS Near-Real-Time Processing at GES DISC

- Currently processing through L1B
- Most data are available within 2-3 hours of observation
- Still working through some issues
- Might be resource limited with L2
  - Need to transition to linux, but need port of NOAA software